§ 42.130 Description and qualifications.

(a) In many instances, food containers are loaded directly into carriers immediately after final packaging. This situation makes stationary lot sampling and inspection impractical. For such circumstances, the optional procedure for on-line sampling and inspection using cumulative sum sampling plans is provided. On-line sampling and inspection is a procedure in which subgroups of sampling units are selected randomly from predesignated portions of production. The acceptability of the portions of production is determined by inspecting, at the time of the sampling, the subgroups which represent these portions. On-line sampling and inspection contrasts with stationary lot procedures in which sample units are selected randomly and inspected and lot acceptability determinations are made only after lot production is completed.

(b) On-line sampling and inspection procedures may be instituted only when all of the following conditions are met:

(1) When authorized by the Administrator and acceptable to the user and producer, if different from the user.

(2) When inspection is origin inspection (see § 42.102).

(3) When previous production lots from the producer are currently on, or eligible to be on, either normal or reduced inspection. (When shifting from stationary lot sampling and inspection to on-line sampling and inspection, normal on-line inspection shall be initially used.)

(4) When inspection of the containers is performed at a point after which all condition of container related characteristics are fixed and will not be subject to change during final handling.

§ 42.131 Selection of samples.

(a) Prior to commencement of on-line sampling and inspection, the total amount of production for a given day or shift is predicted and is then subdivided into conveniently designated portions of production approximately equal in size. Portions may be designated by sequential numbers (e.g., containers 1 through 500 are portion 1, containers 501 through 1000 are portion 2, etc.) or by time intervals (e.g., the first half hour of production is portion 1, the second half hour of production is portion 2, etc.) during which the containers are identified by individual production codes for each time interval.

(b) Determine the number of sample units in a subgroup as follows:

Type of Inspection and Number of Sample Units

Normal—25
Tightened—50
Reduced—13

(c) Subgroups are drawn randomly from portions of production throughout the production process and are inspected for defects. The drawing of sampling units may be done in either of two ways: (1) The number of sample units (13, 25 or 50) comprising a subgroup may be drawn at the same time from a randomly chosen point in the production of each portion, or (2) sample units may be drawn individually, but in a random manner, throughout the production of each portion. At least 6 subgroups must be obtained during each basic inspection period regardless of the system used to designate portions of production.

(d) A shift to on-line sampling plans from stationary lot sampling plans (or vice versa) during a basic inspection period is not permitted.

§ 42.132 Determining cumulative sum values.

(a) The parameters for the on-line cumulative sum sampling plans for AQL's applicable to origin inspection are as follows:

Acceptable quality levels	Type of inspection								
	Normal			Tightened			Reduced		
	T	L	S	T	L	S	T	L	S
0.25	0.05	0.95	0.35	0.1	0.9	0.3	0	0	0
1.5	0.5	2	1	0.8	1.6	0.4	0.5	0.5	0
6.5	2	3	1	2.5	3	1	.....	2	1